Remarks

I. Introductory remarks

The Applicants have noted that, in view of the Appeal Brief filed, prosecution of the application has been reopened with the Examiner making new claim rejections. Claims 1-10, 12-16, 18 and 19-21 are pending in this application. Claims 11 and 17 had previously been cancelled. Claims 2 and 20 are cancelled in this paper.

II. Remarks

1. Claim rejections under 35 U.S.C. §112, first paragraph

Claims 1, 2-5, 6-10, 12-15 and 18-21 are rejected under 37 C.F.R. §112, first paragraph, allegedly, as failing to comply with the description requirement.

Claims 1, 12 and 19

The claims are rejected for reciting a polymeric sulfonic acid gellant, while the specification as filed describes only ammonium poly(acryldimethyltauramide-covinylformamide). The Examiner states, "Appellant does not have possession for all polymeric sulfonic acid gellant and poly(acryldimethyltauramide-co-vinylformamide) does not..." The Examiner does not complete her statement. Nevertheless, without making any admission concerning possession, or lack thereof, by the Applicants of the invention comprising all polymeric sulfonic acid gellants, claims 1 and 19 are now amended to specify the gellant as that particular gellant described in the specification. Claims 2 and 20 are accordingly cancelled. Claim 12 already specifies the gellant as poly(acryldimethyltauramide-co-vinylformamide). Therefore, as claims 1 and 19 are amended and claim 12 already recites the specific gellant, the \$112, first paragraph rejection of these claims, and claims 3-10; 13-16, 18; and 21, which depend from, and include all of the limitations of the respective independent claims, should be withdrawn.

2. <u>Claim rejections under 35 U.S.C. §112, second paragraph</u>

Claims 1-10, 12-16 and 18-21 are rejected under 37 C.F.R. §112, second paragraph, allegedly, as being indefinite for failing to point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 1, 12 and 19

The claims are rejected for using the language "less than about 1 percent surfactant". More specifically, the Examiner appears to be objecting to the language "less than about", and has suggested amending the claims to recite either "less than 1 percent" or "about 1 percent". This rejection is respectfully traversed.

The Examiner is invited to review *W.L Gore & Associates, Inc. v. Garlock, Inc.*, 721 F.2d 1540, 220 USPQ 303 (Fed. Cir. 1983) in which the court held that the language "exceeding about 10% per second" is definite. The language "less than about", used in the present specification, is considered to be analogous to "exceeding about". Additionally, a USPTO.gov search of the claims of patents issuing during the period from 1976 to the present date resulted in 59,948 hits for the language "less than about". Since the USPTO has been issuing patents with claims using this language for many decades, the Applicants would urge the Examiner that this language cannot be considered to be indefinite. The Applicants therefore respectfully submit that the present claims do set forth the metes and bounds of patent protection desired for the weight of the surfactant. Therefore, the §112, second paragraph rejection of claims 1, 12 and 19, and claims 3-10; 13-16, 18; and 21, which depend from, and include all of the limitations of the respective independent claims, should be withdrawn.

3. Claim rejections under 35 U.S.C. §103(a)

a. <u>Claims 1-3, 6-10, 12-15 and 18-21</u>

Claims 1-3, 6-10, 12-15 and 18-21 are rejected under 35 U.S.C., allegedly as being unpatentable over Wheeler (WO 97/32559; hereinafter WO'559) in view of the Clariant product brochure (hereinafter "Clariant") or in view of Beerse et al. (US Patent No. 6,294,186; hereinafter US'186). This rejection is respectfully traversed.

The question to be considered, when making a determination as to the obviousness of the present invention under §103(a), is whether one of ordinary skill in the art, at the time the invention was made, would have had a reasonable expectation that substituting the polymeric sulfonic acid gellant taught in Clariant or in US'186 for the conventional gellants described in WO'559 would have placed the present invention into the possession of those skilled in the art, the present invention being a cosmetic or pharmaceutical composition comprising an oil-containing biliquid foam dispersed in a salt-containing aqueous phase, the aqueous phase comprising, as a polymeric sulfonic acid gellant ammonium, poly(acryldimethyltauramide-co-vinylformamide, and having a pH of less than 7, the salt contained in the aqueous phase being present in the composition in an amount in the range of from about 1 to about 10 percent, the gellant being present in the composition in an amount in the range of from about 0.01 to about 10 percent, and the composition comprising less than about 1 percent surfactant, and a method for thickening an oil-containing biliquid foam dispersed in a salt-containing aqueous phase having a pH less than 7, the salt contained in the aqueous phase being present in the composition in an amount in the range of from about 1 to about 10 percent, and the composition comprising less than about 1 percent surfactant,

the method comprising incorporating into the aqueous phase a polymeric sulfonic acid gellant ammonium, poly(acryldimethyltauramide-co-vinylformamide, in an amount in the range of from about 0.01 to about 10 percent.

Prior to addressing the merits of the rejection, the Applicants wish to restate the nature of the present invention. The problem addressed and solved by the present invention is how to formulate a stable and aesthetically appealing (e.g. clear and creamy) water-based, low pH gel which is cooling, gentle and non-greasy, when applied to the skin, while achieving maximum efficacy of incorporated actives, in particular, actives present as electrolytes, e.g., salts, which are known to disrupt gel structure and therefore seriously interfere with the maintenance of a stable, clear gel product, in the absence of significant amounts of surfactants. The present invention provides a product which solves the problem posed, yet not solved, by the prior art. The present invention is directed to a composition comprising an oil-containing (preferably, silicone containing) biliquid foam dispersed in a salt-containing aqueous phase, the aqueous phase comprising a polymeric sulfonic acid gellant, specifically, an ammonium poly(acryldimethyltauramide-co-vinylformamide) gellant, and having a pH of less than 7, the salt contained in the aqueous phase being present in the composition in an amount in the range of from about 1 to about 10 percent, the gellant being present in the composition in an amount in the range of from about 0.01 to about 10 percent, and the composition comprising less than about 1 percent surfactant, wherein said weights are by weight of the total composition. The present invention further relates to a method of thickening a composition comprising a biliquid foam dispersed in a salt-containing aqueous phase having a pH less than 7, comprising gelling the aqueous phase with a polymeric sulfonic acid gellant which is an ammonium poly(acryldimethyltauramide-co-vinylformamide) gellant; the salt contained in the aqueous phase being present in the composition in an amount in the range of from about 1 to about 10 percent, the gellant being present in the composition in an amount in the range of from about 0.01 to about 10 percent, and the composition comprising less than about 1 percent surfactant, wherein said weights are by weight of the total composition.

Each of the cited references or combination of references fails to teach or suggest the invention as claimed.

The WO'559 reference

The Examiner's obviousness rejection is based on the WO'559 reference for teaching an oil-based biliquid foam and dispersions of the biliquid foam in an aqueous gel which are suitable for use in the cosmetics and pharmaceutical industries. The biliquid foam *per se* is a dispersion of oil droplets in an aqueous base using a small amount of surfactant. The biliquid foam further may be incorporated into an aqueous phase having a low pH and comprising a gelling agent. The reference fails to teach or suggest the Applicants' invention, including the use of any polymeric sulfonic acid gellant, generally, or an ammonium poly(acryldimethyltauramide-co-vinylformamide) gellant, specifically, or the surprising and

unexpected advantages of using this particular gellant in a biliquid foam-containing aqueous gel composition, since it does not disclose or suggest a composition comprising an oil-containing biliquid foam dispersed in a salt-containing aqueous phase, the aqueous phase comprising a polymeric sulfonic acid gellant, specifically, an ammonium poly(acryldimethyltauramide-co-vinylformamide) gellant, and having a pH of less than 7, the salt contained in the aqueous phase being present in the composition in an amount in the range of from about 1 to about 10 percent, the gellant being present in the composition in an amount in the range of from about 0.01 to about 10 percent, and the composition comprising less than about 1 percent surfactant.

It is the Examiner's position that the WO'559 reference discloses the Applicants' invention except for the polymeric sulfonic acid gellant and the "appropriate amount of salt". The Examiner relies on the Clariant reference, or on US'186, for the teaching that a polymeric sulfonic acid gellant, more specifically, an ammonium poly (acryldimethyltauramide-co-vinylformamide) gellant (i.e., Aristoflex AVC®), may be substituted for the gellants, such as xanthan gum, described in WO'559 reference, in an attempt to establish *prima facie* obviousness of the present invention. The Examiner offers no basis for her suggestion that it would be obvious to those skilled in the art to modify the compositions of WO'559 to include an appropriate amount of salt.

Clariant

The Clariant brochure describes the properties of a particular polymeric sulfonic acid gellant, Aristoflex® AVC, and examples of oil-in-water emulsions incorporating the gellant. The reference discloses that Aristoflex® AVC is known in the art for use as a gellant and thickener of an aqueous phase of an oil-in-water emulsion, and that the gellant may be used under low pH conditions. The brochure includes four examples of O/W emulsion compositions containing the Aristoflex® AVC gellant, and 2.0 – 4.0 percent surfactants, by total weight of the composition. This reference too does not contemplate the difficulty in the prior art of gelling a low pH aqueous composition containing a significant amount of salt, and therefore, the reference does not provide any teaching to compensate for the defects of the disclosure of the WO'559 reference, as it relates to the presently claimed formulations, since it too fails to disclose or suggest utilizing 0.01–10% of a polymeric sulfonic acid gellant to thicken a composition comprising an oil-containing biliquid foam dispersed in a salt-containing aqueous phase, the aqueous phase having a pH of less than 7, the salt contained in the aqueous phase being present in the composition in an amount of 1 - 10%, and the composition comprising less than 1% surfactant.

<u>US'186</u>

The Examiner uses this reference for the disclosure that one thickener can be used in place of another, and supposedly, for any purpose. The reference describes antimicrobial compositions comprising a benzoic acid analog and a metal salt, and optionally, thickening agents. A laundry list of thickening agents is disclosed, including the following classes: polysaccharides, polyacrylamide polymers,

crosslinked polyacrylate polymers, carboxylic acid polymers, the latter including Carbopol, and "other thickeners" which include Aristoflex AVC and xanthan gum. The reference appears to make no distinction among thickeners and therefore does not recognize or address the problem solved by the present invention.

Combined teachings of the references: WO'559 and Clariant or US'186

The combined teachings of WO'559 and Clariant or US'186 fail to render the present invention obvious because, although one of ordinary skill in the art might have attempted a simple substitution of one known gellant for another, expecting to obtain predictable results (i.e. gelling of the aqueous phase of a low pH biliquid-containing dispersion), the person of ordinary skill in the art could not have predicted that the polymeric sulfonic acid gellant could be used to stably gel the aqueous phase in a biliquid containing aqueous composition, where the aqueous phase has a pH of less than 7 and a significant salt presence, using less than 1 percent by weight of surfactant, based on the total weight of the composition.

In fact, one skilled in the art, at the time the invention was made, would have expected the presence of salts in the composition to affect the viscosity response of the gellant, and thus to destabilize the gel, in the absence of a significant level of surfactants. See, for example, U.S. Patent No. 6,197,318, issued March 6, 2001, at column 11, line 65-column 14, line 17. As disclosed in the patent, carboxyvinyl polymers, such as Carbopols (used as gellants in the WO'559 reference) are known to demonstrate poor salt tolerance when incorporated into external use compositions containing salts, such that the compositions containing the polymers have poor stability (column 11, line 65 - column 12, line 3). It is also disclosed in the patent that, although surfactants had traditionally been used in cosmetic emulsion compositions to provide stability, it was becoming increasingly desirable to limit the amount of surfactants due to safety and environmental considerations (column 13, lines 58-67). Additionally, it is discussed in the patent (column 14, lines 1-17) that although carboxyvinyl polymers were considered for use as surfactant replacements, the poor salt tolerance of the polymers required the presence of a further component, e.g., xyloglucan, in the case of the patent, to impart stability to the composition. It is considered surprising and unexpected; that is, entirely unpredictable, in view of the teachings in the references, and the knowledge of those skilled in the art at the time of the present invention, that the polymeric sulfonic acid gellant would be unaffected by the presence of salts in the composition, such that a stable, smooth, non-pilling gel would result without the need for significant levels of surfactants in the composition. In fact, example 2 in WO'559 employs sodium chloride as a thickening agent, rather than the Carbopol used in all of the other examples, together with a substantial amount of a combination of surfactants. Therefore, the Examiner's conclusion, from the disclosure in US'186, that "Since xanthan gum and ARISTOFLEX AVC have been recognized in the art to be thickening agents, one thickening agent can be used in place of the other to obtain the same gelling of thickening effect" is rebutted.

Notwithstanding the above, the Examiner objects that the Applicants' use of US 6,197,318 to demonstrate that Carbopol has poor tolerance for salts, does not also demonstrate poor salt tolerance for the other thickeners disclosed in WO'559. The Applicants would urge that it would be unduly burdensome to have to demonstrate a salt intolerance property for a dozen or so other gellants described in WO'559, when all of the examples in the reference employ Carbopol (except for example 2 which utilizes sodium chloride as a thickening agent). Additionally, the Applicants are entitled to use specific examples to support their position when the Examiner uses specific examples in attempt to support her position that WO'559 discloses low pH and low surfactant and high salt compositions, such as to render the present invention prima facie obvious. The point is that the reference does not recognize that conventional thickeners, such as Carbopol, used in the examples, are salt sensitive at low pH, and that low pH gels, containing significant amounts of salt, require substantial amounts of surfactant to stabilize them. Because the references do not recognize or address the problem solved by the present invention, the combined disclosure of the references does not place the present invention into the possession of those skilled in the art.

In view of the knowledge of one skilled in the art concerning the gel destabilizing nature of salts, the Examiner's suggestion that "it would be obvious to use appropriate amount of salt that would be provide desired pearlescence and luster to the gelled composition" also is found by the Applicants to be technically unsound. Moreover, the Examiner does not provide a basis for her conjecture.

The Applicants acknowledge that the WO'559 reference discloses a composition containing a biliquid foam dispersed in an aqueous phase. However, the only teaching in the reference of such compositions having a pH less than 7 is found in the first three examples. While Example 1 of the reference contains less than 1% of surfactants – polyoxyethylene lauryl ether and lauryl betaine, and the pH of the aqueous phase is 6.5, the low pH formulation not only lacks the presence of a polymeric sulfonic acid gellant, but also fails to include a further essential feature of the claimed invention: an aqueous phase comprising from about 1 to about 10% salt.

As discussed on pages 1 and 2 of the present specification, the problem in the prior art addressed by the present invention is how to formulate a stable, water-based gel-type composition, while achieving the maximum efficacy of incorporated actives, particularly oil-soluble actives, and maintaining an aesthetically pleasing, i.e. clear and non-pilling, appearance and an aesthetically appealing, i.e., creamy, texture. The problem is compounded since many actives can disrupt gel structure, leading to an unstable product with an unacceptable feel on the skin, even moreso when the actives comprise acids, present as electrolytes. Therefore, even were the gellant in the Example 1 formulation of the WO'559 reference replaced by Aristoflex AVC, taught by Clariant or US'186, the resulting formulation would not be the same as the Appellants' compositions, since the resulting formulation would lack the presence of substantial amounts of electrolytes/salts.

Examples 2 and 3 of the reference are directed to conditioning shampoos, the low pH formulations each also including 3% NaCl. However, even were the gellant of these formulations replaced by Aristoflex AVC, taught by Clariant or US'186, these formulations also would not meet the limitations of the present claims, which require less than 1% surfactant. Each of the formulations of reference Examples 2 and 3 contains over 20 weight percent surfactants, including ammonium lauryl sulphate, ammonium lauryl ether sulphate, cocamidopropyl betaine, coconut diethanolamide and cetostearyl alcohol. The amount of the aqueous ammonium lauryl sulphate alone in each of the Example 2 and 3 formulations is 13.5% (33% aqueous solution x 41wt. % of the total composition). As disclosed in the reference at page 5, line 27-page 6, line 10, shampoos and shower gels generally contain 4-18% by weight of a primary surfactant and 2-15% by weight of a coactive surfactant. It is disclosed in particular on page 5, lines 7-10 that, "It is clear from the above description that by the nature of the conventional formulations this kind of dispersion contains a higher proportion of surfactant than those previously described as features of the invention." In fact, it is well known that, particularly in shampoos, surfactants are the primary cleansing agent and that surfactants are selected based on proper detergency without degreasing (cleaning without removing too much oil from the hair), ability to form delicate and rich bubbling, easy rinsing, good finish after washing hair, minimal skin/eye irritation, no damage to hair, low toxicity and good biodegradability. Generally, the higher alcohol type-anion surfactant provides the proper detergency and forms rich bubbles, and a non-ionic surfactant is added as coadjuvant. Additionally, the proper balance of surfactants provides a shampoo with a slightly acidic pH of about 5.5 - 6.5, since a basic environment weakens the hair by breaking the disulfide bonds in hair keratin. Citric acid is typically used to provide the desired pH. The cuticle of the hair, which is exposed after the sebum is stripped away, is covered with overlapping scales that are smoothed and soothed in a properly acidic environment. Aggravated scales don't overlap nicely, and they make hair look dull and feel rough. They can also snag other raised scales on neighboring shafts, resulting in snarls. Therefore, Examples 2 and 3, the only disclosure of low pH, salt-containing compositions in the WO'559 reference, fail to disclose or suggest the Appellants' invention. The Appellants' claims require a composition comprising an oilcontaining biliquid foam dispersed in a salt-containing aqueous phase, the aqueous phase comprising 0.01-10% of a polymeric sulfonic acid gellant and having a pH of less than 7, the salt contained in the aqueous phase being present in the composition in an amount of 1 - 10%, and the composition comprising less than 1% surfactant. As discussed above, one of ordinary skill in the art, reading the disclosure in the WO'559 reference, at page 6, lines 7-10, together with Examples 2 and 3, would simply not have been led to reduce the total amount of surfactants in the low pH shampoo formulations of examples 2 and 3 in the WO'559 reference. Given the state of the art at the time the present invention was made (see U.S. Patent 6,197,318, discussed herein), there would have been no reasonable expectation that a polymeric sulfonic acid gellant, such as that described in Clariant or US'186, would have successfully gelled low pH

compositions containing a significant level of salt, such as the shampoo formulations in Examples 2 and 3 of the WO'559 reference, in the absence of substantial amounts of surfactants to stabilize the formulation. The difficulty in gelling a low pH aqueous composition containing a significant level of salt is not at all contemplated by the reference. The only teachings one of ordinary skill in the art could have derived from the WO'559 reference concerning gelling low pH formulations are that, in the absence of salts, very little surfactant will stabilize the composition, while in the presence of salts, a significant amount of surfactant is required to stabilize the composition.

That the WO'559 contemplates compositions which may contain salts in an amount in the range called for by the Appellants' claims, or which may contain very low levels of surfactant is not sufficient to place the Appellants' invention into the possession of one of ordinary skill in the art. The mere fact that references can be combined or modified does not render the resultant combination obvious unless the results would have been predictable to one of ordinary skill in the art. KSR International Co. v. Teleflex Inc., 82 USPQ 2d 1385, 1396 (US 2007). Nowhere in the cited reference is there described or suggested a biliquid foam dispersed in a gelled aqueous medium where the gellant used is polymeric sulfonic acid; the pH of the composition is less than 7; the composition contains about 1-10% salts; and the composition is stabilized with less than about 1% surfactant. In the present invention, the use of the polymeric sulfonic gellant results in advantages, as discussed herein, which are entirely unpredictable from the cited reference.

The combined teachings of the references fail to place the claimed invention in the possession of one or ordinary skill in the art, since, while the skilled person might have been led to try the Aristoflex® described in Clariant or US'186 as the gellant in the dispersions in the WO'559 reference, the person of ordinary skill in the art would not have been led to also modify the concentrations of salt and surfactant so as to arrive at the Applicants' invention. It could not have been predicted, by those skilled in the art, that the use or the substitution of the polymeric sulfonic acid gellant, as taught by Clariant or US'186, for the conventional gellants in a low pH formulation, including a significant level of electrolytes, such as Examples 2 or 3 of the WO'559 reference, would have permitted a reduction in the total amount of surfactant used to stabilize the formulation to less than 1%. As noted in the present specification at page 3, line 26-page 4, line 6, the gellants recommended for use in the WO'559 reference perform adequately in non-acidic formulations; however, these gellants are incapable of creating a stable dispersion when the aqueous phase to be gelled contains even low levels of electrolytes (e.g., salts of desired active ingredients) at an acidic pH. The Applicants have previously submitted two Declarations (under 37 CFR 1.132, by inventors Harrison and Matathia-Jacobs) which demonstrate that, under certain conditions, including a pH of less than 7, a salt-containing aqueous phase, and less than 1% surfactants, carbomers (e.g. Carbopol), as well as other gellants recommended by the WO'559 reference, for gelling a biliquid foam-containing aqueous gel composition, do not provide a homogeneous, stable, and aesthetically and

commercially acceptable product. On the other hand, it is clear from the Declarations that the use of the polymeric sulfonic acid gellant does not merely result in a superior gelling effect, but in a surprising benefit, e.g., an entirely unpredictable outcome. Any efficacy of the polymeric sulfonic acid gelling agents to stabilize an oil-containing biliquid foam dispersed in a salt-containing aqueous phase having an acidic pH of less than 7, in the absence of significant quantities of surfactants, could not have been predicted by those of ordinary skill in the art from the teachings in the cited references and the knowledge of those of ordinary skill in the art at the time of the invention. The unexpected results unequivocally rebut any *prima facie* case of obviousness that may be found in combining the teachings in WO'559 and Clariant or US'186. ((*In re Soni*, 54 F.3d 746, 34 USPQ2d 1684 (Fed. Cir. 1995). When an applicant demonstrates substantially improved results ... and states that the results were unexpected, this should suffice to establish unexpected results in the absence of evidence to the contrary.))

In the paragraph of the office action common to pages 11 and 12, the Examiner states:

In response to Appellant's arguments that page 3, line 26 to page 4, line 6 that the gellants in Wheeler '559 performs in non-acidic formulations and are incapable of creating stable dispersions in the presence of low levels of electrolytes, it is noted that Wheeler '559 strongly suggest acidic pHs by adjusting the compositions in examples 1-6 to pHs of less than 7 of 7. In response to Appellant's mention of the filed 11/01/2003, it is noted that the declaration was addressed on pages 2 and 3 of the office action of 1/30/2004.

The Applicants respectfully advise the Examiner that both of the above sentences appear to be incomplete. The first sentence provides no indication as to the origin of the arguments attributed to the Appellant. Similarly, the Applicants cannot make sense of the second sentence. The Applicants have reread the Appeal Brief for the purpose of locating any mention of these arguments without success. It further is not clear why the Examiner is referring to documents dating back to 2003 and 2004. Therefore, the Applicants are unable to address these points at this time.

b. Claims 1-10, 12-16 and 18-21

Claims 1-10, 12-16 and 18-21 are rejected under 35 U.S.C. §103(a) as being unpatentable over WO'559 in view of US'186 and further in view of Vatter *et al*; (US 6,224,888; hereinafter US'888) or France *et al*; (US 4,184,978; hereinafter US'978). This rejection is respectfully traversed.

WO'559 and US'186 are discussed above. The Examiner considers the teaching in WO'559, as modified by the teaching in US'186 to disclose the present invention except for the salts recited in present claims 4, 5 and 16. For this disclosure, the Examiner relies on US'888 and US'978.

<u>US'888</u>

The reference is concerned with a method of improving the skin penetration of vitamin B₃ compounds from a cosmetic composition. The composition may optionally include skin care actives, and the reference discloses a laundry list of such actives, including moisturizers, for example, alpha-hydroxy acids. It is the Examiner's position that one having ordinary skill in the art would have had a reasonable

expectation of success that adding the moisturizers, such as the salts of lactic acid, to the compositions of WO'559, as modified by Clariant or US'186, would effectively aid in moisturizing and conditioning the skin and hair. The combination of WO'559 and US'186 fails to teach the present invention, since it does not teach, explicitly or implicitly, a biliquid foam dispersed in an aqueous phase and gelled with ammonium poly(acryldimethyltauramide-co-vinylformamide), including:

- the aqueous phase having a pH less than 7, and
- the aqueous phase including 1-10% salt, and
- the composition comprising less than 1% surfactant.

US'888 too fails to recognize the problem solved by the present invention which is how to formulate a stable and aesthetically appealing (e.g. clear and creamy) water-based, <u>low pH</u> gel, while achieving maximum efficacy of incorporated actives, in particular, actives present as electrolytes, e.g., <u>salts</u>, which are known to disrupt gel structure and therefore seriously interfere with the maintenance of a stable, clear gel product, <u>in the absence of significant amounts of surfactant</u>, and therefore cannot cure the deficiencies in WO'559 and US'888.

US'978

This reference describes water-in-oil emulsion systems for cosmetic and pharmaceutical use which are stabilized by a unique combination of emulsifiers, including certain acyl lactylates, the efficacy of which is said to be attributable in part to the fact that lactic acid and its salts are found naturally in the skin and maintain skin's moisturization. US'978 fails to cure the deficiencies of the teachings of WO'559 and US'186 for the same reason given above with respect to US'888.

For all of the above reasons, the Examiner has not established *prima facie* obviousness of the present invention, and it respectfully requested that the claim rejections be withdrawn.

CONCLUSION

WO'559 discloses low pH formulations of biliquid foam dispersed in an aqueous phase, which may be stabilized with less than 1% surfactant. The Clariant brochure and US'186 disclose a polymeric sulfonic acid gellant, ammonium poly(acryldimethyltauramide-co-vinylformamide), useful in gelling a low pH aqueous phase of an emulsion. Nevertheless, nowhere in the references is the difficulty in gelling a low pH, salt-containing aqueous phase contemplated, and nowhere in the references is there any disclosure which would have suggested to one of ordinary skill in the art that this particular polymeric sulfonic acid gelling agent would be efficacious in stabilizing an oil-containing biliquid foam dispersed in an aqueous phase having an acidic pH of less than 7, and containing significant amounts of electrolytes (e.g., salts), in the absence of significant quantities of surfactants. Such an unexpected and surprising benefit could not have been predicted by those of ordinary skill in the art from the teachings in the cited

references and their knowledge at the time of the invention. The unexpected results unequivocally rebut any *prima facie* case of obviousness that may be found in combining the teachings in WO'559 and the Clariant brochure. That US'888 and US'978 disclose the use of alpha hydroxy acids in cosmetic compositions for the purpose of delivering moisturization to skin cannot cure the deficiencies in the combined teachings of WO'559, Clariant and US'186, since neither US'888 or US'978 even recognizes the problem solved by the present invention.

In light of the amendments and the arguments presented herein, the §112, first paragraph rejection of claims 1, 3-5, 6-10, 12-15 and 18-21, the §112, second paragraph rejection of claims 1-10, 12-16 and 18-21, the §103(a) rejections of claims 1-3, 6-10,12-15 and 18-21, based on WO'559 in view of Clariant or US'186, and the §103(a) rejections of claims 1-10; 12-16, and 18-21, based on WO'559 in view of Clariant or US'186, and further in view of US'888 or US'978, should be withdrawn as they are unfounded.

The present claims are considered to be in condition for allowance, and prompt issuance of a Notice of allowance is respectfully solicited. The Examiner is encouraged to contact the undersigned by telephone if it is believed that discussion will resolve any outstanding issues.

A petition and the requisite fee for two months extension of time are submitted concurrently with this paper.

Respectfully submitted,

Date:

Cyuthia R. Miller, Esq., Reg. No. 34 678

Estee Lauder Companies

155 Pinelawn Road, Suite 345 South

Melville, N.Y. 11747 tel. (631) 414-6068 fax (631) 531 1340